## **ABSTRACT OF THE DISCLOSURE**:

An apparatus and process for electrolytically producing metal foil which is diminished in pinhole defects and has a uniform thickness. The metal foil is produced by passing an electric current between a cylindrical cathode immersed in an electrolytic solution and an anode opposed to the cathode, continuously electrodepositing a metal layer on the surface of the cathode while rotating the cathode and thereafter peeling the metal layer off. An auxiliary anode capable of adjusting the current density when electrodeposition is started is disposed at a position downstream from the anode with respect to the direction of flow of the electrolytic solution. The auxiliary anode is an electrode having a coating layer comprising an electrode active substance and formed over an electrically conductive metal substrate, with an intermediate layer of tantalum or a tantalum alloy formed between the coating layer and the substrate.